

542  
DART AEROSPACE LTD

Work Order: 24372

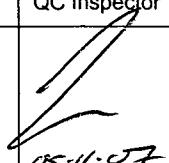
Description: Wearplate Part Number: D2577-3

Dwg: D2577 Rev. E Qty: 50  
Page 1 of 1

Step	Location	Procedure	By	Date	Qty
1	DC	Issue Traveller <b>Dwg not required</b>	JF	05.09.29	50
2	PG	Issue P/O: 2008744 Email or Ship DXF file to vendor Laser Cut per Dwg D2577 flat pattern D2577-101 <b>Material release note required</b>	AP	05/09/30	50
3	RG	Receive and Inspect for transit damage <b>Ensure that material release note is attached</b>	CL	05/10/12	50 42 PTO
4	QC6	Inspect dimensions per template D2577-101T1	JF	05.11.07	42
5	GB	Deburr if necessary	N/A		
6	GB	Form on brake as per Dwg D2577 using DT8155 and DT8179 <b>Identify as D2577-3</b>	JB	05/11/08	42
7	QC5	Inspect work to Step 6	JF	05.11.08	42
8	WS	Weld hard surface using DT8308A & DT838B as per Dwg D2577	CPL	05.11.30	42
		Qty A/R Description Batch	7560 Hardcoat Rod M19100		
9	QC9	Inspect weld	AB	05/12/01	42
10	FP	Powder Coat Grey (Ref.4.3.5.6) per QSI 005 4.3	FC	05/12/20	42
11	QC3	Inspect Powder Coat	M	05/12/21	42
12	FP	Identify and Stock	M	05/12/21	42
13	AC	Cost / part	N	05.12.21	42
14	DC	Close W/O Inspect Level 21	(D)	05/12/21	42

Rev	Date	Change	Revised By	Approved
A	96.08.20	New Issue		
B	98.04.15	Changed finish detail, changed forming sub-contractor	KB	
C	99.02.02	Added inspection levels, Jig numbers	DM	
D	00.10.02	Reformat	EC	
E	01.06.08	Powder coat in house and went back to laser cut.	EC	
F	02.09.24	Re-format; Incorporated D2577-101/13	KJ RF	RF

RELEASED  
02/10/02 RF

W/O:		WORK ORDER CHANGES						
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Mfg / Design Mgr	Approval QC Inspector	
05/10/20	2+3	Tool 8 for w/ <del>10</del> 24519 D34601 please adjust costs in MD	le	05/10/20	8	le		

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Design Mgr	Approval QC Inspector
			Initial Design Mgr	Action Description Design Mgr	Sign & Date			

Part No: \_\_\_\_\_

PAR #: \_\_\_\_\_

Fault Category: \_\_\_\_\_

NCR: Yes

 NoDQA: 

Date: 05/10/20

NOTE: Date &amp; initial all entries

QA: N/C Closed: \_\_\_\_\_

Date: \_\_\_\_\_

## Job Costing Report

Dart Aerospace Ltd.  
HawkesburySep 28, 2005  
03:40 pm

Work Order No : 0024372  
 Project Name : D2577-3  
 Project For : WK542  
 Work Order Type : Main  
 Main WO Number :  
 House Part Number : D2577-3  
 Description : Wearplate Aft  
 Manufactured : Yes  
 Amount Req'd : 50  
 Amount Done : 0  
 Start Date : 09-28-05  
 Est Finish Date : 10-20-05  
 Act Finish Date :  
 Drawings Reqd : No  
 Ok for Approval :  
 Approval Rec'd : \$0 Posted to Finished Goods

Department Code:  
 Burden Flags : NNNNNNN  
 WO Status : Open  
 Invoice State : Not Invoiced  
 Invoice Date :  
 Invoice Number :  
 Invoice Amount : 0.00

Order Entry No :  
 OE Value : 0.00

Est Mark Up : 0.000%  
 Actual Mark Up : 0.000%

	Estimated	Actual	Var. %	Posted	To Post
Material Cost :	0.00	0.00	0.00	0.00	0.00
Engineering Hours :	0.00	0.00	0.00		
Engineering Cost :	0.00	0.00	0.00	0.00	0.00
Production Hours :	0.00	0.00	0.00		
Production Cost :	0.00	0.00	0.00	0.00	0.00
Packaging Hours :	0.00	0.00	0.00		
Packaging Cost :	0.00	0.00	0.00	0.00	0.00
OverHead Hours :	0.00	0.00	0.00		
OverHead Cost :	0.00	0.00	0.00	0.00	0.00
CNC Hours :	0.00	0.00	0.00		
CNC :	0.00	0.00	0.00	0.00	0.00
Misc. Hours :	0.00	0.00	0.00		
Misc. :	0.00	0.00	0.00	0.00	0.00
<hr/>					
Burden :	0.00	0.00	0.00		
<hr/>					
Total Cost :	0.00	0.00	0.00		
Mark up :	0.000	0.000			
Selling Cost :	0.00	0.00			

	Estimated	Actual
Labour Hrs/Amount Done :	0.00	0.00
Profits/(Loss) :	0.00	0.00



New Zealand Steel Limited  
Glenbrook, South Auckland  
Postal: Private Bag 92121, Auckland, New Zealand  
Telephones: (09) 375 8999 / 375 8111 Auckland  
(09) 235 8069 / 235 3535 Waiuku  
Fax: (09) 375 8959

## TEST CERTIFICATE

Ref: 5078/21768

CUSTOMER	Wilkinson	P50128DI003	SPECIFICATION	ASTMA1008 CS Type A	CERTIFICATE No	TC109561																			
CUSTOMER O/N	90-21N-540		PRODUCT	CRA WIDE COIL	PAGE	1 of 1																			
MILL O/N	471159		DIMENSIONS	0.055" x 48" x Coil	DATE	23 April 2005																			
PACK NUMBER	HEAT No	CHEMICAL COMPOSITION PERCENT						MECHANICAL TESTS (TEST SPECIFICATION - ASTMA370)																	
		C	Si	Mn	P	S	Cu	Ni	Cr	Mo	V	Nb	Ti	Al	B	N2	CE( )	BEND 180°	YIELD	T.S.	%ELONG G.L.=	HARDNESS HRB	r ( )	LENGTH (feet)	
R9-457097-00	640590	4	TR	20	13	17	12	17	20	1	8	1	1				x10000	x100							
R9-457098-00	640590	4	TR	20	13	17	12	17	20	1	8	1	1									46		1562	
R9-457099-00	640590	4	TR	20	13	17	12	17	20	1	8	1	1									46		1483	
R9-457100-00	640590	4	TR	20	13	17	12	17	20	1	8	1	1									46		1562	
R9-457101-00	640590	4	TR	20	13	17	12	17	20	1	8	1	1									46		1496	
R9-457102-00	640590	4	TR	20	13	17	12	17	20	1	8	1	1									47		1562	
																								47	1555

YIELD (A)=0.2% PROOF STRESS (B)=LOWER YIELD STRESS	GAUGE LENGTH (G.L.) (A)=200mm (B)=50mm	PLASTIC STRAIN RATIO (r) (A)=r0 (B)=r90 (C)=80mm (D)=5.65 / So (E)=2" (F)=8"	IMPACT TEST (A)=10mm x 10mm (B)=7.5mm x 10mm	(C)=5mm x 5mm (D)=2.5mm x 10mm (E)=5mm x 10mm	CARBON EQUIVALENT VALUE (CE) (A)=C+Mn/6 (B)=C+Mn/6+(Cr+V+Mo)/5+(Cu+Ni)/15	(C)=C+Mn/6+Si/24 (D)=
WE HEREBY CERTIFY THAT THE MATERIAL DESCRIBED HEREIN HAS BEEN TESTED AND INSPECTED WITH SATISFACTORY RESULTS IN ACCORDANCE WITH THE REQUIREMENTS OF THE ABOVE SPECIFICATION						

APPROVED *Satish Misra*  
QC METALLURGIST

16 ga crms

Date: Thursday, 11/17/2005 12:07:44 PM  
 User: Linda Lacelle

## Process Sheet

<b>Customer</b>	: CU-DAR001 Dart Helicopters Services	<b>Drawing Name</b>	: WEARPLATE
<b>Job Number</b>	: 24372	<b>Part Number</b>	: D25773
<b>Estimate Number</b>	: 10298	<b>Drawing Number</b>	: D2577 REV E
<b>P.O. Number</b>	:	<b>Project Number</b>	:
<b>This Issue</b>	: 11/17/2005	<b>Drawing Revision</b>	: E
<b>Prsht Rev.</b>	: NC	<b>Material</b>	:
<b>First Issue</b>	: / /	<b>Due Date</b>	: 11/30/2005
<b>Previous Run</b>	:	<b>Qty:</b>	50
<b>Written By</b>	:	<b>Um:</b>	Each
<b>Checked &amp; Approved By</b>	:		
<b>Comment</b>	: Est: F 02.09.24 Re-format; Incorporated D2577-101/13KJ/ RF		

## Additional Product

Job Number:



Seq. #:	Machine Or Operation:	Description :	
1.0	PG	PURCHASING	
<b>Comment:</b> PURCHASING Issue P/O: _____ Email or Ship DXF file to vendor Laser Cut per Dwg D2577 flat pattern D2577-101 Material release note required			
2.0	D25773F	Wearplate Aft	
3.0	PACKAGING 1	PACKAGING RESOURCE #1	
<b>Comment:</b> PACKAGING RESOURCE #1 Receive & Inspect For Transit Damage Ensure material release note is attached			
4.0	QC6	DIMENSIONAL CHECK	
<b>Comment:</b> DIMENSIONAL CHECK Inspect dimensions per template D2577-101T			
5.0	SMALL FAB 1	SMALL & MEDIUM FAB RESOURCE 1	
<b>Comment:</b> SMALL & MEDIUM FAB RESOURCE 1 Deburr			
6.0	BRAKE NC	NC BRAKE	
<b>Comment:</b> NC BRAKE 1-Form on brake as per Dwg D2577 using DT8155 and DT8179 2-Identify as D2577-3			

Date: Thursday, 11/17/2005 12:07:45 PM  
User: Linda Lacelle

## Process Sheet

Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: WEARPLATE

Job Number: 24372

Part Number: D25773

Job Number:



Seq. #: Machine Or Operation:

Description :

7.0 QC5 INSPECT WORK TO CURRENT STEP



Comment: INSPECT WORK TO CURRENT STEP

8.0 LARGE FAB 1 LARGE FABRICATION RESOURCE 1



Comment: LARGE FABRICATION RESOURCE 1

Weld hard surface using DT8308A & DT8308B as per Dwg D2577

Qty	Description	Batch
A/R	7560 Hardcoat Rod	

9.0 QC9 VISUAL WELDING INSPECTION



Comment: VISUAL WELDING INSPECTION

10.0 POWDER COATING POWDER COATING



Comment: POWDER COATING

Powder Coat Grey Sandtex (Ref: 4.3.5.6) as per QSI 005 4.3

11.0 QC3 INSPECT POWDER COAT/CHEMICAL CONVERSION



Comment: INSPECT POWDER COAT/CHEMICAL CONVERSION

12.0 PACKAGING 1 PACKAGING RESOURCE #1



Comment: PACKAGING RESOURCE #1

Identify and Stock

Location: \_\_\_\_\_

13.0 DC DOCUMENT CONTROL



Comment: DOCUMENT CONTROL

Inspection Level 21

Job Completion



## Job Costing Report

Dart Aerospace Ltd.  
HawkesburyNov 08, 2005  
11:51 am

Work Order No : 0024372  
 Project Name : D2577-3  
 Project For : WK542  
 Work Order Type : Main  
 Main WO Number :  
 House Part Number : D2577-3  
 Description : Wearplate Aft  
 Manufactured : Yes  
 Amount Req'd : 50  
 Amount Done : 0  
 Start Date : 09-28-05  
 Est Finish Date : 10-20-05  
 Act Finish Date :  
 Drawings Reqd : No  
 Ok for Approval :  
 Approval Rec'd :  
 Department Code:  
 Burden Flags : NNNNNNN  
 WO Status : Open  
 Invoice State : Not Invoiced  
 Invoice Date :  
 Invoice Number :  
 Invoice Amount : 0.00  
 Order Entry No :  
 OE Value : 0.00  
 Est Margin : 0.000%  
 Actual Margin : 0.000%

\$0 Posted to Finished Goods

	Estimated	Actual	Var. %	Posted	To Post
Material Cost :	0.00	611.49	100.00	0.00	611.49
Engineering Hours :	0.00	0.00	0.00		
Engineering Cost :	0.00	0.00	0.00	0.00	0.00
Production Hours :	0.00	0.00	0.00		
Production Cost :	0.00	0.00	0.00	0.00	0.00
Packaging Hours :	0.00	0.00	0.00		
Packaging Cost :	0.00	0.00	0.00	0.00	0.00
OverHead Hours :	0.00	0.00	0.00		
OverHead Cost :	0.00	0.00	0.00	0.00	0.00
CNC Hours :	0.00	0.00	0.00		
CNC :	0.00	0.00	0.00	0.00	0.00
Misc. Hours :	0.00	0.00	0.00		
Misc. :	0.00	0.00	0.00	0.00	0.00
=====		=====	=====		
Burden :	0.00	0.00	0.00		
=====		=====	=====		
Total Cost :	0.00	611.49	100.00		
Margin :	0.000	0.000			
Selling Cost :	0.00	611.49			

	Estimated	Actual
Labour Hrs/Amount Done :	0.00	0.00
Profits/(Loss) :	0.00	( -611.49)